

DILUTE CLEANING COMPOSITION AND METHOD FOR USING SAME

Abstract of the Disclosure

A cleaning method in a semiconductor fabrication process includes providing
5 a dilute composition consisting essentially of phosphoric acid and acetic acid and
exposing a surface, e.g., aluminum, to the dilute composition. For example, the dilute
composition includes phosphoric acid at a concentration of about 5% or less by volume
and acetic acid at a concentration of about 30% or less by volume. Further, the cleaning
method may use a composition comprising phosphoric acid and acetic acid, wherein the
10 composition includes phosphoric acid at a concentration of X%, wherein X is about 5%
by volume or less, and acetic acid at a concentration of about (100-X%) by volume or
less. The cleaning method may be used, for example, in fabricating interconnect
structures, aluminum containing structures, and multilevel interconnect structures.
Cleaning compositions for use in the cleaning methods are also provided.

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